

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/805,354	03/22/2004	Kazuhiro Hattori	119180	9010
25944 OLIFF & BER	7590 06/06/2007 RRIDGE PLC		EXAMINER	
P.O. BOX 19928 ALEXANDRIA, VA 22320			WATKO, JULIE ANNE	
			ART UNIT	PAPER NUMBER
			2627	
			MAIL DATE	DELIVERY MODE
			06/06/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Applicant(s) Application No. 10/805.354 HATTORI ET AL. Office Action Summary Examiner **Art Unit** Julie Anne Watko 2627 -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**Period for Reply** A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION. Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication. If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b). **Status** 1) Responsive to communication(s) filed on <u>27 February 2007</u>. 2b) This action is non-final. 2a) This action is **FINAL**. 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213. **Disposition of Claims** 4) \boxtimes Claim(s) 1-17 and 19 is/are pending in the application. 4a) Of the above claim(s) 16,17 and 19 is/are withdrawn from consideration. 5) Claim(s) _____ is/are allowed. 6) Claim(s) 1-15 is/are rejected. 7) Claim(s) _____ is/are objected to. 8) Claim(s) _____ are subject to restriction and/or election requirement. **Application Papers** 9) The specification is objected to by the Examiner. 10) The drawing(s) filed on 22 March 2004 is/are: a) accepted or b) dobjected to by the Examiner. Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a). Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d). 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152. Priority under 35 U.S.C. § 119 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) \boxtimes All b) \square Some * c) \square None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No. 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. Attachment(s) 1) Notice of References Cited (PTO-892) 4) Interview Summary (PTO-413)

2) Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) Information Disclosure Statement(s) (PTO/SB/08)

Paper No(s)/Mail Date 10/29/2004.03/22/2004.

Paper No(s)/Mail Date. ___

6) Other:

5) Notice of Informal Patent Application

Application/Control Number: 10/805,354 Page 2

Art Unit: 2627

DETAILED ACTION

Election/Restrictions

1. Applicant's election with traverse of group I, claims 1-15 in the reply filed on February 27, 2007, is acknowledged. The traversal is on the ground(s) that serious burden is lacking. This is not found persuasive because the inventions have acquired a separate status in the art in view of their different classification, and because the prior art applicable to the elected invention would not likely be applicable to the non-elected invention.

The requirement is still deemed proper and is therefore made FINAL.

Specification

2. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the elected claims are directed.

Drawings

3. Figure 15 should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). Corrected drawings in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Claim Rejections - 35 USC § 112

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Application/Control Number: 10/805,354 Page 3

Art Unit: 2627

5. Claim 2 and its dependent claims 6 and 13 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The term "smaller" in claim 2 is a relative term which renders the claim indefinite. The term "smaller" is not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention. It is unclear how small is "smaller"; thus, the metes and bounds of the claim may not be ascertained.

Claims 6 and 13 are indefinite by virtue of their dependency from indefinite claims.

6. Regarding claims 2, 6 and 13: In the absence of a reasonably definite interpretation of a claim, it is improper to rely on speculative assumptions regarding the meaning of a claim and then base a rejection under 35 U.S.C. 103 on these assumptions (In re Steele, 305 F.2d 859,134 USPQ 292 (CCPA 1962)). See MPEP 2143.03.

Claim Rejections - 35 USC § 102

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
- 8. Claims 1, 4-5, 7-12 and 14-15 are rejected under 35 U.S.C. 102(e) as being anticipated by Fukutani et al (US PAP No. 20030072971 A1).

As recited in claim 1, Fukutani et al show a magnetic recording medium 1030 comprising a magnetic layer (including 1031 and 1034) which is sectioned into a plurality (see Fig. 4) of data areas 1035 and a plurality of servo areas 1036 for information recording, wherein: in each of the servo areas, the magnetic layer is separated into a plurality of servo pattern unit parts 1034 forming a predetermined servo pattern and a servo pattern peripheral part/servo pattern peripheral parts 1031 surrounding (see Fig. 3) the servo pattern unit parts 1034; and the servo pattern unit parts 1034 and the servo pattern peripheral part/parts 1031 are formed in different sizes ("different volumes", see ¶ 0033) so as to have different magnetic properties (see ¶ 0033, "differences in magnetic properties").

As recited in claim 4, Fukutani et al show that the servo pattern peripheral part/parts includes/include a set of a plurality of servo pattern peripheral elements 1031 formed smaller (see Fig. 3; see also ¶ 0123-0134, especially 0126, "different magnetic substance volumes") than the servo pattern unit parts 1034.

As recited in claims 5 and 7-8, Fukutani et al show that the servo pattern unit parts and the servo pattern peripheral part/parts are formed in different sizes so as to have different coercivities (see ¶ 0052) as the magnetic properties.

As recited in claim 9, Fukutani et al show that the servo pattern unit parts and the servo pattern peripheral part/parts are formed in different sizes so as to have different magnetic anisotropies (see ¶ 0052) as the magnetic properties.

As recited in claim 10, Fukutani et al show that the servo pattern unit parts and the servo pattern peripheral part/parts are formed in different sizes so as to have different residual magnetizations (see ¶ 0052) as the magnetic properties.

Application/Control Number: 10/805,354 Page 5

Art Unit: 2627

As recited in claim 11, Fukutani et al show that in each of the data areas, the magnetic layer is physically separated into a number of recording elements (1031 or 1042, for example; see Fig. 3).

As recited in claims 12 and 14-15, Fukutani et al show that the servo pattern unit parts and the servo pattern peripheral part/parts are magnetized in opposite polarities (see Fig. 7F).

Claim Rejections - 35 USC § 103

- 9. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 10. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).
- 11. Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over Fukutani et al (US PAP No. 20030072971 A1).

Fukutani et al show a medium as described above.

As recited in claim 3, Fukutani et al are silent regarding whether each of the servo areas has only a single, integral servo pattern peripheral part.

Art Unit: 2627

There is no invention in integration or separation of parts, when the integration or separation was within the level of ordinary skill in the art, and when the functioning the of apparatus is not changed by the integration or separation. See *In re Fridolph*, 135 USPQ 319 (CCPA 1962). See also *In re Larson*, 144 USPQ 347 (CCPA 1965). Furthermore, the fact that a structure is integral does not preclude its consisting of various elements. See *Nerwin v*. *Erlichman*, 168 USPQ 177 (BPAI 1969).

No teaching, suggestion, or motivation to alter a reference is required to establish a prima facie case of obviousness. *KSR International Co. v. Teleflex Inc.*, 550 U.S. (2007).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to integrate the servo pattern peripheral parts of Fukutani et al. The rationale is as follows: one of ordinary skill in the art would have been motivated to simplify production by eliminating a non-magnetic layer formation step.

Conclusion

12. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Julie Anne Watko whose telephone number is (571) 272-7597. The examiner can normally be reached on Monday-Friday, 10AM to 6:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dwayne D. Bost can be reached on (571) 272-7023. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Application/Control Number: 10/805,354 Page 7

Art Unit: 2627

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

May 25, 2007 JAW Julie Anne Watko Primary Examiner Art Unit 2627